

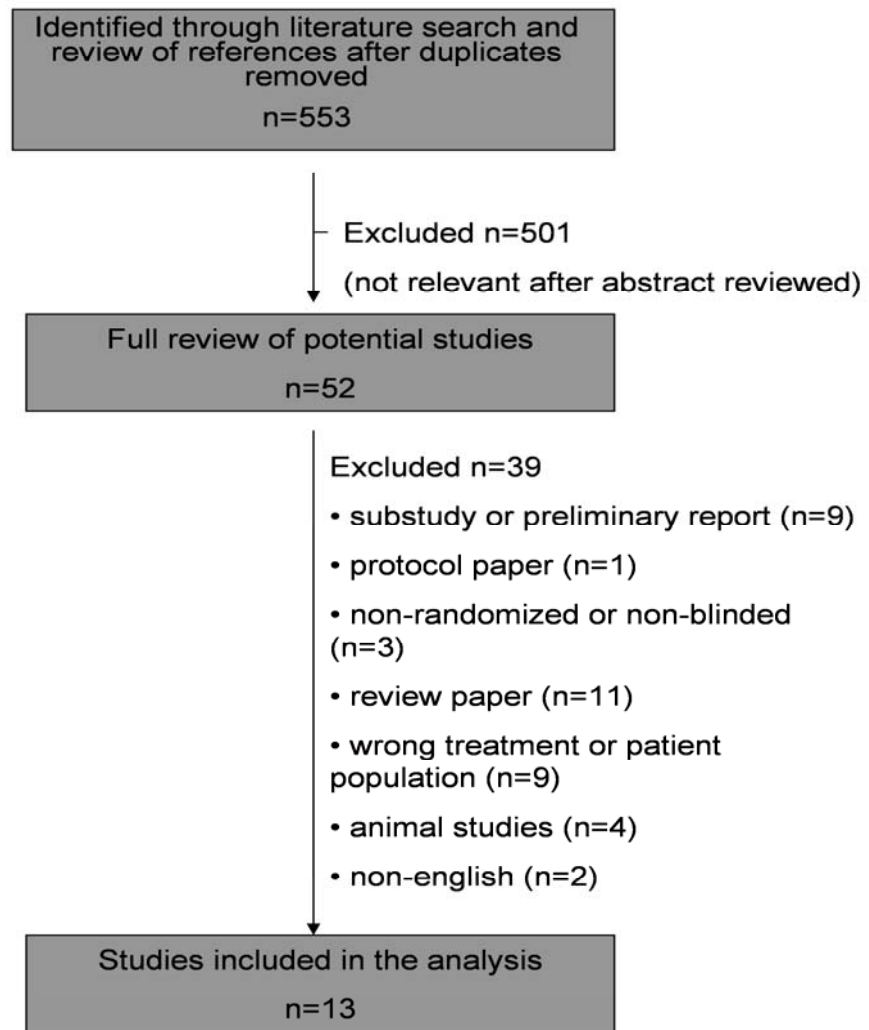
Appendix 2 (as supplied by the authors): Results of updated meta-analysis of granulocyte colony-stimulating factor after myocardial infarction

Supplemental Table 1: Included studies							
Study	Date	Intervention	Follow-up	Baseline LVEF		Follow-up LVEF	
				Control	G-CSF	Control(n)	G-CSF(n)
Ince et al. ¹	2005	G-CSF 10 µg/kg for 6 days Initiated 89 ± 35 minutes of PCI	Echo at 4 months	47.0 ± 5.0	48.0 ± 4.0	43.0 ± 5.0 (25)	54.0 ± 8.0 (25)
Valgimigli et al. ²	2005	G-CSF 10 µg/kg for 6 days Initiated 37 ± 66 hours of PCI	SPECT at 6 months	42.0 ± 7.0	41 ± 10.0	48.0 ± 9.0 (10)	50.0 ± 15.0 (10)
Ripa et al. ³	2006	G-CSF 10 µg/kg for 6 days Initiated within 48 hours of PCI	Echo at 6 months	55.7 ± 9.8	51.2 ± 15.4	53.1 ± 11.8 (24)	55.6 ± 11.2 (29)
Zohlhofer et al. ⁴	2006	G-CSF 10 µg/kg for 5 days Initiated within 5 days of PCI	MRI at 6 months	49.2 ± 8.7	51.3 ± 15.4	51.2 ± 9.0 (47)	51.8 ± 7.7 (49)
Engelmann et al. ⁵	2006	G-CSF 10 µg/kg for 5 days Initiated within 48 hours of PCI	MRI at 3 months	44.0 ± 9.0	41.0 ± 12.0	49.5 ± 12.0 (19)	47.0 ± 12.0 (18)
Ellis et al. ⁶	2006	G-CSF 5 or 10 µg/kg for 5 days. Initiated within 48 hours of PCI	Echo at 30 days	33.7 ± 1.6	5 µg/kg 36.8 ± 7.5 10 µg/kg 33.5 ± 4.8	41.7 ± 8.2 (6)	5 µg/kg 41.3 ± 10.3 10 µg/kg 38.7 ± 7.3 (6)
Kang et al. ⁷	2006	G-CSF 10 µg/kg for 4 days Initiated within 14 days of PCI	Echo at 2 years	44.4 ± 9.2	53.0 ± 14.3	51.3 ± 9.4 (10)	53.1 ± 12.8 (10)
Takano et al. ⁸	2006	G-CSF 2.5 µg/kg for 4 days Initiated within 24 hours of PCI	SPECT at 6 months	45.6 ± 9.7	47.2 ± 10.6	49.0 ± 14.1 (19)	51.8 ± 10.8 (16)
Leone et al. ⁹	2007	G-CSF 10 µg/kg for 5 days Initiated 5 days after PCI	Echo at 5 months	38.0 ± 6.0	40.0 ± 6.0	38.0 ± 8.0 (27)	45.0 ± 6.0 (13)
Suarez de Lezo et al. ¹⁰	2007	G-CSF 10 µg/kg for 10 days Initiated 5 days after PCI	Invasive LV-gram at 3 months	39.0 ± 6.0	37.0 ± 5.0	45.0 ± 8.0 (10)	42.0 ± 14 (10)
Achilli et al. ¹¹	2010	G-CSF 5 µg/kg BID for 5 days Initiated within 12 hours of PCI	MRI at 6 months	39.6 ± 7.0	39.4 ± 6.0	45.6 ± 10.7 (24)	45.2 ± 11.2 (25)
Guo et al. ¹²	2010	G-CSF 10 µg/kg for 7 days Initiated between 3 and 5 days of PCI	Echo at 6 months	40.9 ± 5.4	42.2 ± 7.2	47.9 ± 6.5 (16)	51.2 ± 6.0 (17)
Karimabad et al. ¹³	2011	G-CSF 10 µg/kg for 5 days Initiated 24 hours after PCI	Echo at 6 months	37.1 ± 6.4	36.5 ± 6.4	38.3 ± 5.5 (7)	42.6 ± 6.7 (8)
Hibbert et al. (current study)	2013	G-CSF 10 µg/kg for 4 days Initiated 3-4 days after PCI	LVRNA at 6 months	36.4 ± 9.0	34.8 ± 7.2	46.0 ± 10.6 (41)	40.8 ± 11.3 (39)

Appendix to: Hibbert B, Hayley B, Beanlands RS, et al. Granulocyte colony-stimulating factor therapy for stem cell mobilization following anterior wall myocardial infarction: the CAPITAL STEM MI randomized trial. *CMAJ* 2014. DOI 10.1503/cmaj.140133.

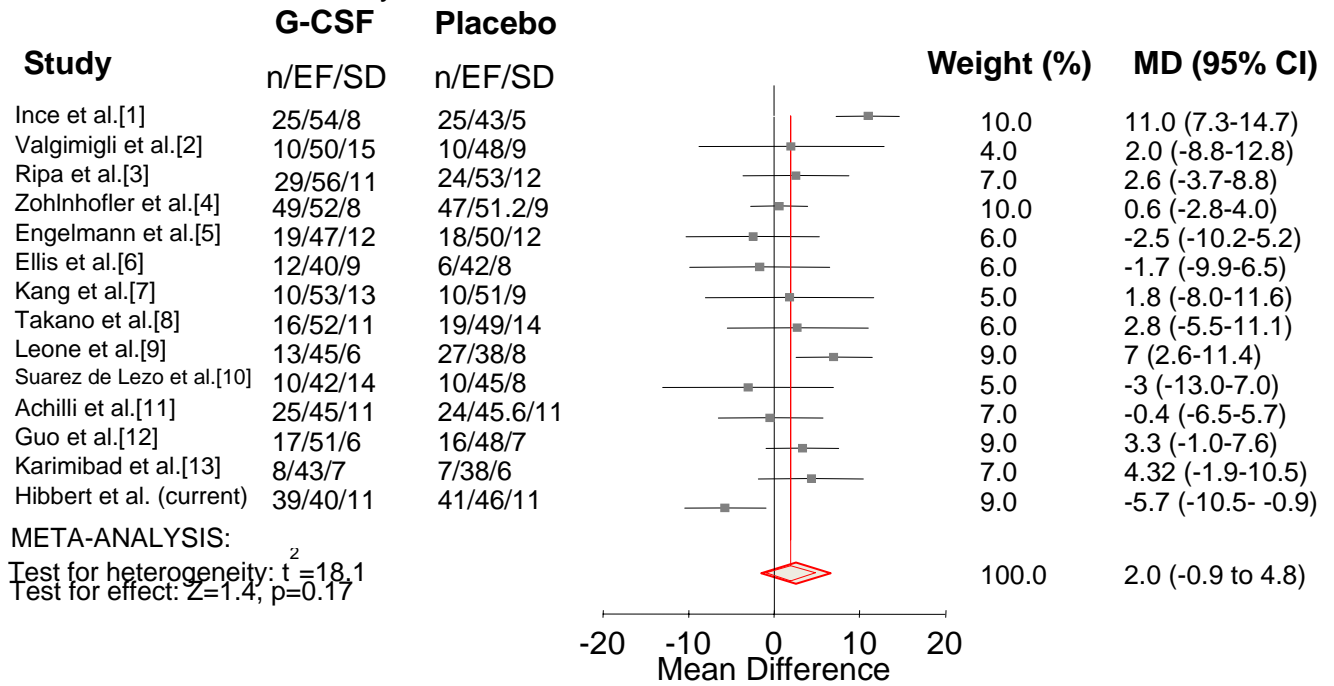
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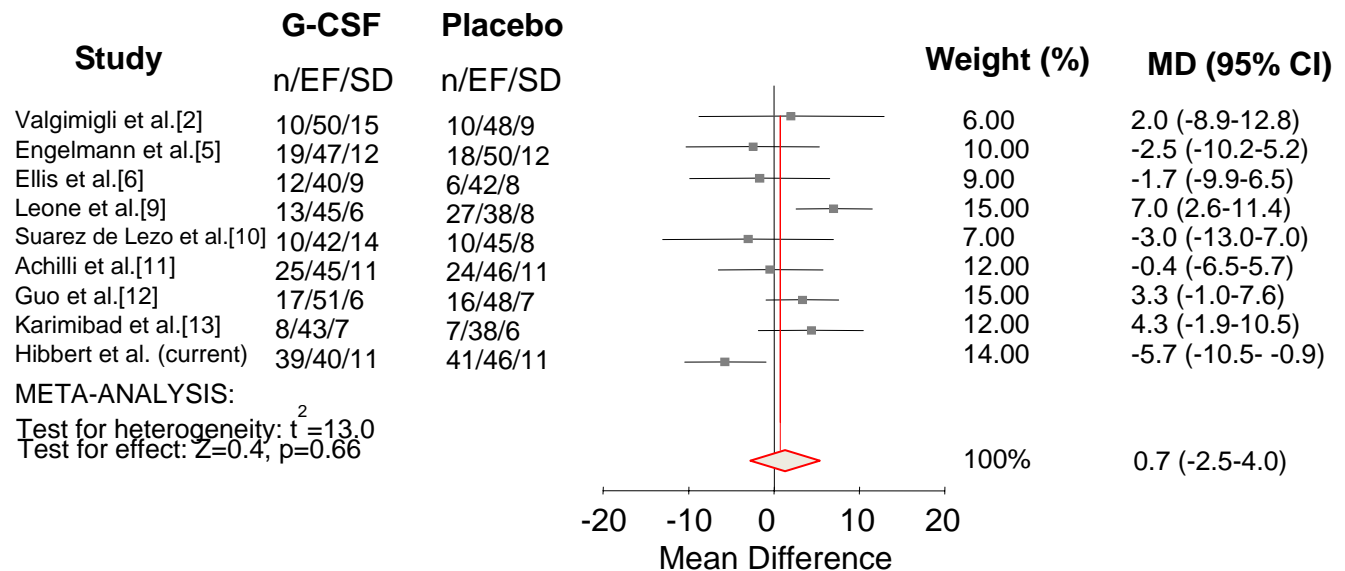


Supplemental Figure 1. Flow diagram of included studies for the meta-analysis.

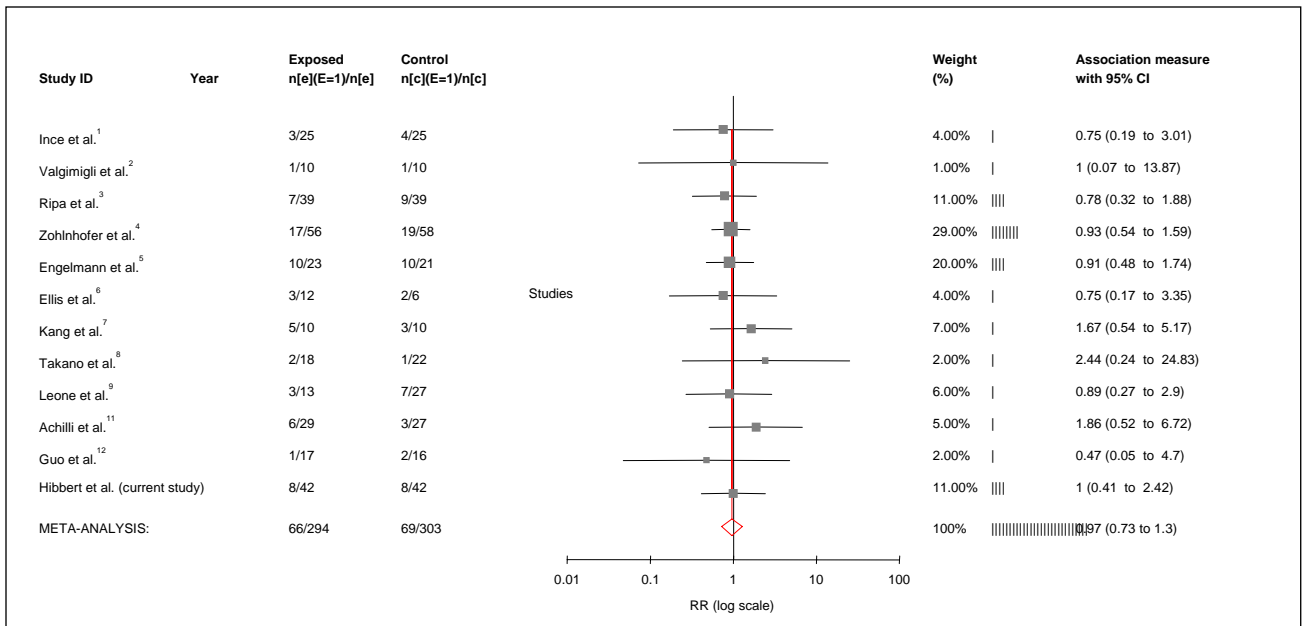
A – Cumulative Meta-Analysis



B – Meta-Analysis of trials EF < 45%



Supplemental Figure 2. Meta-analysis of randomized trials comparing G-CSF to placebo. **A** – Cumulative meta-analysis of the effect of G-CSF on follow-up left ventricular ejection fraction (LVEF). **B** – Effect of G-CSF on follow-up LVEF in patients with baseline EF of <45%. All analyses performed using random effects models. n – number of patients; EF – ejection fraction; SD – standard deviation; MD – mean difference.



Supplemental Figure 3. Meta-analysis of major adverse cardiac events (MACE) in randomized trials of G-CSF to placebo.

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